Working towards a Framework for Enhancing Pubic E-Procurement for Zimbabwe State Owned Enterprises (SOEs)

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***Abstract*— *The purpose of this study is to* assess the potential of e-procurement in the public sector of Zimbabwe with State Owned Enterprises (SOEs). E-Procurement is more than just a system for making purchases online. Some organisations implement e-procurement and succeed while others fail. The objectives of the study were to establish the status quo of e-procurement in Zimbabwe public Procurement, identify major areas of e- procurement challenges, to establish being faced in Zimbabwe public procurement, and recommend a framework that enhances e-procurement in Zimbabwe. The research involved a case study of State Owned Enterprises in Zimbabwe. A purposive sampling technique was adopted for the study and out of the target number of 60 respondents, 50 questionnaires were validly completed and returned. The collected data was analyzed using SPSS and Microsoft excel presented in tables and figures. From the study, it was revealed that employee competency, inadequate legal framework, inadequate technological infrastructure and security of procurement transaction data were challenges to e-Procurement adoption in the organizations under review. The study recommends continuous training of staff on e-Procurement. In addition, formal recognition backed by legislation of the electronic procurement transactions should be encouraged. Integration of the institutions system and those of the suppliers, demonstration of the positive impact of the systems, and installation of linkages between all Governments agencies should be encouraged.**

Keywords— *Corruption, Public Procurement, E-procurement, Service Delivery, State Owned Enterprises*

1. Introduction

Public procurement history dates back to the development of the silk trade of China and a Greek colony in 800B.C as attested by [1]. Ref. [2] proffers that the earliest procurement order was inscribed on a red clay table which was found in Syria with order dates that ranged from 2400 and 2800B.C for '50 jars of fragment smooth oil for small weight in grain''. In the United States of America, Page (1980) reported that government procurement in municipalities were earlier than the state and federal governments with no procurement officials.

In the late 1800s state legislatures began to create boards responsible for public procurement. Public procurement account for up to (5%) of gross domestic product in developing countries and averages about (20%) of public expenditure this has been estimated by the Organisation for European Co-operation and Development (OECD). Ref. [3] reported that public procurement officials around the globe control spending that is close to (10%) to (30%) of gross net profit (GNP) in any given year. Ref. [4] noted that, Central government purchases range from (9%) to (13%) in the Middle East and this indicates that public procurement in a country plays a vital role. Ref. [5] conform that public procurement expenditure constitutes (65%) of the total public sector. According to the [6], the United Kingdom public sector spends over £175 billion per annum on bought in goods and services. Similarly, a [7] also indicated that the annual value of public procurement for goods, works, and consultancy services in Ghana was about US$600 million. Ref. [8] assert that Uganda channels about US$ 700 million a year from domestic revenue resources and donor funds through the public procurement processes. Ref. [7] estimates that 10-15% of this amount (US$100 million) is wasted due to weak procurement structures, policies and procedures, as well as failure to impose sanctions for violations of the procurement units.

Ref. [9] reports that public procurement has been perceived as an area of waste and corruption. Ref. [10] complements that, a good procurement is one devoid of corruption and based on well-known procurement practices that promote efficiency and effectiveness, is the vehicle for better service delivery. Corruption in public procurement processes leads to problems such as lack of accountability and transparency, lack of political control and auditing, weak professionalization of the bureaucracy and many more [11]. Reducing corruption in public procurement has been on the

agenda of many governments [12]. To overcome these concerns relating to corruption in the government procurement, information and communication technology (ICT) can play an important role to reduce corruption by promoting good governance [10], enhancing relationships between government employees and citizens tracking activities, monitoring and controlling the government employees and reducing potentiality of corrupt behaviours. Public e-procurement is one of the important factors in public procurement reform and can play a significant supporting role in making governments more transparent and accountable [12].

Public sector organizations globally have identified e-procurement as a priority and have implemented or are in the process of implementing e-procurement [13]. There is interest in the application of public e-procurement technology to enhance efficiency to improve the speed and quality of procurement processes, and importantly to enhance transparency and accountability in government procurement. According to [14] e-procurement has been popular in advanced countries like Australia, UK, and USA as well as in governments in emerging economies including China, India, Mexico, South Korea, Malaysia, and Brazil, which are implementing e-procurement initiatives. Ref. [15] noted that public e-government systems could increase transparency by improving public sector service delivery in developing countries such as India, Ethiopia, and Fiji. E-procurement is seen as an effective way to better support transparency and accountability [16]. A study by [17] in Nepal revealed that e-tendering is perceived to have the potential to improve transparency and accountability, which in turn, can reduce the likelihood of corruption in public tendering. This findings is supported by other previous studies that public e-procurement could be used as anti-corruption tool [18].

The public procurement system in Zimbabwe has been marred by scandals, evidenced by the deterioration of ethical obligations and morality in the procurement business [19]. The study carried out by [5] reveals challenges in Zimbabwe's public procurement include: delays in making decisions, corruption and the need to comply with SPB procedures. Poor service delivery in Zimbabwe is attributed to problems in the procurement process. The problems include inventory shortages of essential goods such as medicines, poor quality goods due to lack of proper procurement planning, cumbersome procurement processes as well as ignorance of procurement best standards, policies and legislation [20]. Ref. [21] reveal that SPB control the legal framework and all tender documents and adverts as well as evaluation. Some of the most popular scandals in public procurement in Zimbabwe include: Allied Timbers-2015, Central Vehicle Registry (CVR) 2015, Zimbabwe National Roads Administration (ZINARA) 2014, Zimbabwe National Roads Administration (ZINARA) 2014, Central Mechanical Department (CMED) 2014, and ZESA Holdings – 2014.

Given these scandals, it is evident that the model used by Zimbabwean government through SPB is not being effective. SPB is using a misplaced business model that has created a platform for white collar corruption which is bleeding the nation to its knees. If this problem is not addressed, the state enterprises will keep on losing the scant resources that it has. To curb this mishap, the research therefore seeks to assess the preparedness of Zimbabwe government in the adoption of public e-procurement (PEP) framework. Transparent e-procurement process, committed public managers and political officials, honest vendors and specific policies and regulations enhance governance in procurement. The government can benefit from a transparent e-procurement process which has a positive effect on good governance practice, increase cost effectiveness, accountability and mitigate collusion among suppliers. This research therefore sought to work towards a framework that enhances public e-procurement in Zimbabwe's (SOEs).

2. Literature Review

2.1 Status quo of e-procurement Public Procurement

While various governments are encouraging public sector agencies to adopt e-Procurement, its implementation does not appear to have been smooth and the rate of e-Procurement implementation success has been less than spectacular, as supported by [22] claim that "Government e-Procurement projects have been notoriously unsuccessful". The development and implementation of e-Procurement has not been as easy as some of the solution providers have suggested, nor has it necessarily brought the anticipated savings. Furthermore, engaging suppliers in the process, especially smaller organizations, is also proving to be difficult given the level of investment expected in terms of providing catalogue information to buyers, and marketplaces using different technologies, platforms and business languages [23].

Difficulties also seem to stem from the tension between Buy Local policies designed to promote a local economy, and the efficiencies to be achieved through volume purchasing from large suppliers

[24]. Although a number of public sector agencies are actively pursuing e-Procurement, evidence from business press reveals that many of the efforts are not meeting original expectations. In fact, implementation rate of public e-procurement systems has been slow and many government agencies tend to overstate the degree to which they are involved in e-Procurement [25]. Despite the benefits that can be achieved from a successful e-Procurement implementation in the public sector, the business press has reported a number of failures of e-procurement initiatives in a number of public sector agencies in the USA, UK and New Zealand in recent years. As observed by [26], e-Procurement will result in large investments of time and money, without absolute certainty that its full potential will be achieved every time.

These views are supported by a number of cases reported in the business press. The US Government's General Services Administration had been criticized following embarrassing revelations that it was unreliable and error-prone [27], while the British government decided not to extend its pilot e-tendering system across Whitehall [27]. In a similar vein, [28], [29] and [30] report that the New Zealand Government's GoProcure e-Procurement system has proved more complex to develop than expected, while the UK Ministry of Defence is yet to achieve savings three years after its e-Procurement service first started running [27]. According to [31], the State of South Carolina abandoned its e-Procurement system in June 2002 and pilot projects were shut down in 2002 in Massachusetts, Indiana, and Michigan. The Virginia state auditor reported only 1.5 percent of the state's business was transacted through its state-of-the-art $USD14.9 million system [31].

There is, however, a view that the rumours of e-Procurement's demise have been greatly exaggerated [32]. For example, [33] using a survey of 168 US public and private sector organizations, indicate that e-Procurement technologies will become an important part of supply chain management and that the rate of adoption will accelerate as the adopters share their experiences of success factors and perceptions of low risk. Similarly, [34] identified e-Procurement as the element of e-business most contributory towards the e-Business operational excellence of large corporations. Such success and failure stories imply that there is a need for a much better understanding of Critical Success Factors (CSFs) in regards to the e-Procurement implementations and use in the public sector. Ref. [35] provides a succinct summary of this sector's relationship with e-Procurement: "The public sector cannot afford to uncritically follow the latest fads and fashions, it can, however, form a strong base of self-knowledge, confidence and with an eye to the future become an innovator in this field".

2.2 Major areas of e-procurement in public procurement

There are various forms of e-procurement that concentrate on one or many stages of the procurement process such as e-Tendering, e-Marketplace, e-Auction/Reverse Auction, and e-Catalogue/Purchasing, e-Procurement can be viewed more broadly as an end-to-end solution that integrates and streamlines many procurement processes throughout the organization. [36], [37] identified the following systems, each type of the system is built for a special purpose and has its own specific functionality and characteristics.

2.2.1 E-Informing/E-notification

Gathering and distributing purchasing information both from and to internal and external parties using internet technology. It involves an organization electronically notifying potential suppliers of a future tendering opportunity and this is facilitated through an online notification system.

2.2.2 E-Sourcing

[38] e-sourcing is internet enabled applications and decision support tools that facilitate interactions between buyers and suppliers through the use of online negotiations, online auctions, reveres auctions and similar tools. E-sourcing is a strategy which is associated with online auctions which promote price reduction by introducing the element of competition, visible, clearly structured and make the procurement process transparent. It is also the process of identifying new suppliers for specific categories of purchasing requirements using internet technology.

2.2.3 E-Tendering

The process of sending requests for information and prices to suppliers and receiving the response using internet technology. This involves an organization having the capacity to electronically receive tender submission from potential suppliers. Typically this is facilitated through online tender receipt systems, similar to that used for the tender notification.

2.2.4 E-Reverse auctioning

Internet based reverse auction technology which focuses on the price of the goods and services auctioned. With e-reverse auction the price quoted by suppliers generally decreases.

2.2.5 E-Awarding

This involves secure tender opening (being able to only open tenders that have been submitted by closing date and time), tender evaluation and tender award. Typically this is facilitated using similar systems to those used for e-notification and e-tendering.

2.2.6 E-Contract Management

The use of information technology for improving the efficiency and effectiveness of contracting processes of companies. It involves the establishment of an agreement with a supplier and can arise as a result of the e-notification, e-tendering and e-awarding stages; or can arise through technology solutions, for example an e-auction which typical involves suppliers bidding for the supply of goods based on tender specification prepared by an organization. Unlike conventional auction where the prices generally increases, e-auction are commonly referred to us reverse auction as the price quoted by suppliers generally decreases.

2.2.7 E-Ordering

The use of Internet to facilitate operational purchasing process, including ordering (requisitioning), order approval, order receipt and payment process. This involves an organization raising orders of agreed contracts or catalogue (following on from the stages above) and the transmission and acceptance of this by suppliers.

2.2.8 E-Markets

E-markets are meeting venues for component suppliers and purchasers, who use exchange mechanism to electronically support the procurement process. Early e-procurement solution focused on this aspect of e-procurement (e.g. electronic data interchange, e-catalogue and e-marketplaces) as this was perceived as the era where maximum efficiency could be achieved since it has a direct link with e-ordering.

2.2.9 E-MRO and Web based ERP

The process of creating and approving purchasing requisitions, placing purchase orders and receiving the goods or services ordered via a software system based on internet technology, e-MRO deals with indirect items (MRO), and web-based ERP deals with product-related items.

2.2.10 E-Invoicing

This involves an organization electronically receiving invoices from suppliers and following electronic matching (e.g. against the purchase and goods received notes) making electronic payment via a Bank Automated Clearing system (BAC). This electronic payment of suppliers has been identified by many organizations as a quick win in relation to e-procurement, given the processes and activities. E-invoicing is performed alongside E-MRO and ERP above.

Ref [39] believes that public e-procurement is the central instrument to assist the efficient management of public resources. He further argued that public procurement supports the works and services of the government and can cover all acquisitions, including stationery, furniture, temporary office staff and complex and high cost areas such as construction projects. Ref. [40] earlier on argued that public e-procurement is a government business system which is concerned about the government procurement process such as preparing project specification, requesting, receiving and evaluating bids, awarding contract and payment. However public procurement is not a one-off activity, it is a processes based action with multi- phases.

According to [5], public procurement in Zimbabwe is governed by the State Procurement Act [Chapter 22; 14] of 2009. The Act provides that purchase transaction that exceed the US$500 000 for Goods and Services and US$2m for construction is done by the State Procurement Board outlined the following stages: Procurement planning, Inviting offers, Awarding contracts and managing contracts to be followed in the procurement activities of the public entities. There seems to be consensus that the role of public procurement is to facilitate the effective functioning of government machinery and for this to be feasible, procurement must be carried out in stages devoid of circumvention. Ref. [41] definition thus seemed appropriate for the purpose of this study.

2.3 Challenges being faced in Public Procurement

Governments in many countries are making conscious efforts to migrate their procurement activities towards e-procurement platforms; however, there remain a shortage of knowledge of the actual adoption of e-procurement experiences in the public sector [42]. To derive the accompanying

benefits entailed in e-procurement adoption procurement staff must be competent enough to use the applications of software that offers the organization management skills to manage their activities for example, distribution chain and value addition in a company [43]. This technology is based on databases, which are easily reached on real time foundations. ERP systems perfectly provide the procurement management and the management itself with the opportunity to produce steadfast, consistent, and timely information necessary for attainment of organizational goals. According to [44] many procurement entities do not have competent human resource critical to manage procurement processes. The absence of the right calibre of employees to bring about enforcement of Quality standards, monitor e-procurement processes, determination of specifications, defining requirements, conducting supervisory roles eventually culminate to cause shortages in government budgets. Ref. [45] argued that skills and knowledge of employees influence the future adoption of a new technology. They further argued that implementing e-procurement necessitates knowledgeable and skilled employees, therefore, the conspicuous lack of such personnel has attributed to delay in e-procurement adoption in most public institutions. Literature has established that there exist a direct correlation between an institution's capacity to explore new technology and its pool of human resources. A feasibility study on implementation of full e-procurement in Tanzania pointed out some key issues including readiness of existing legislative framework, Information and Communication Technologies (ICTs), infrastructure and People [46], [47]. For an effective and efficient computer based procurement to be adopted there is the need for the maintenance of employee competence by ensuring that they are trained on related issues so that they can appreciate the legal frameworks and networks of their suppliers in the conduct of their business [48].

It is commonly believed that instead of considering the supply chain to be a 50/50 mix of infrastructure and information systems technology, rather any supply chain is more like 45/45/10 mix of human behaviour, systems technology and asset infrastructure [49]. Ref. [50] indicated that people are "… the most important element of the logistics marketing concept." Ref. [51] noted: "To take supply chain performance to the next level, companies will have to tap into this human element more intensively. Many companies have pushed hard on technological and infrastructural improvements and investments. The next wave of improvements and investment should center on the people who manage and operate the supply chain. "As e-procurement includes new technologies and changes in traditional procurement approaches, the need to train staff in procurement practices and the use of e-procurement tools are critical to the success of an e-Procurement initiative [7]. End-users can realize the immediate benefits of the e-Procurement system once they understand the operational functionalities [52]. This means that training should be given a high priority, alongside the need for public sector agencies to identify the skills required by all those engaged in procurement [53].

Legal framework is a basis of any business transaction whether in Public sector or private businesses. It defines the obligations and responsibilities of the partners transacting business with the objectives of fulfilling each other's desired goals. Ref. [54] found that the laws governing B2B commerce, crossing over to e-procurement, are still undeveloped. For instance, questions concerning the legality and force of e-mail contracts, role of electronic signatures, and application of copyright laws to electronically copied documents are still unresolved. The Public Procurement Authority recognize that the existing PPA 2005 and PPDR 2006 legal framework in Zimbabwe may not have adequately covered aspects of e-procurement transaction.(PPA., The long term policy framework for Public Procurement 2009).

Issues concerning information systems development and adoption are central to the e-procurement issue. Ref. [55] identified systems integration as a critical success factor for e-procurement implementation, both with the customer's information infrastructure and in its links to suppliers. In an earlier study, [56] surveyed the adoption pattern of IOS. It was not surprising that email, web sites, funds transfer and EDI dominated the list. Email and web sites are dominant and ubiquitous systems, whilst major banks provide support for electronic funds transfer which provides a secure, low cost means of payment. EDI on the other hand is only cost effective for high volume transaction and communication between common trading hierarchies. Often, EDI is deployed for the management of direct supply chains, i.e. for components and materials in manufacturing, or saleable products in retailing. The cost per unit is then relatively low, the benefits of high speed transmission and the sunk cost of investment are all factors which are seen as likely to sustain EDI, or at least integrate it into an Internet- EDI structure for the management of specific high frequency exchange supply chains. A recent commercial report by [57] demonstrated that there remained a slow uptake of e-procurement systems, emphasizing that system infrastructure-related issues such as software integration (including discussion of XML related

opportunities) were inhibiting implementation. Ref. [54] investigated the adoption of e-procurement in Singapore and presented stumbling blocks to this initiative from the point of view of Singaporean firms and that significant investment in hardware, software, and personnel training to participate in e-procurement are prohibitive. Technological infrastructure plays a key role in adoption of e-procurement without which integration of public procurement entities will not materialize.

A number of recent studies have also looked into difficulties faced by firms in launching e-procurement. In a recent survey of 102 international active e-marketplaces and procurement service providers, [58] found that concerns over security and confidentiality of the data needed to be exchanged in electronic environments was perceived as among the barriers to implementation of electronic procurement. [59] examined buyers' perceptions of e-procurement risks and arrived at three dimensions: first transaction risks resulting from wrong products purchased due to incomplete or misleading information; Second security risks resulting from unauthorized penetration of trading platforms and failure to protect transaction related data while being transmitted or stored; and Third privacy risks arising from inappropriate information collection and information transparency. Ref. [60] found that both buyer and seller firms in their sample considered the lack of adequate security measures to protect data as one of the prohibitive and discouraging factors in implementation of e-procurement. Individual end users and entire business units will naturally resist any change in business processes that poses uncertainty in security and privacy of their transactions. Organizations keep their business information secret as a protective mechanism to ward off competition and remain competitive in the business environment. Public sector organizations on the other hand have limits to the amount and nature of information to be shared with other third parties. The Public procurement legal framework in Ghana legislated on confidentiality of public procurement process. The use of web technology has brought a myriad of data security challenges in internet transactions because of cyber-crimes .The growth of internet has nevertheless brought serious challenges to business due to data hacking, internet fraud, Cyber vandalism, and virus and malware attacks [55].

3. Methodology

This study adopted research philosophical triangulation, which is a combination of positivism and phenomenological research philosophies. The nature of the study could not be positivism or phenomenology only. The researchers was therefore guided by the fact that positivism research philosophy uses quantitative data and employs highly structured data collection procedures to facilitate replication. In order to identify and explain attitudes of the respondents the researchers remained consistently independent and objective from what the current study. In order to explore the potential e-procurement in the public sector, the study used a quantitative research methodology: which involves sampling technique, data collection, data analysis and trying to understand it in a particular context.

The target population for the study was made up of; procurement officers, finance officers, planning officers, store officers and project managers. The reason for targeting officers mentioned above is to ascertain the depth of the challenges associated with the e-procurement system. The study involved 50 respondents selected randomly and reasonably from different departments. Data were analyzed and expected to represent the views of all staff concerning the barriers for using e-procurement system. For the purpose of this study, purposive sampling technique and its subset snowball sampling was applied. This is because it was believed that all the target respondents engaged in procurement function at their various institutions and were in a better position to respond to the research questions effectively. Snowball technique was used to enable the researchers purposively identified the right respondents in the various categories of interest. Primary data was used for the study. The primary data was obtained directly from respondents through the administration of questionnaires and interviews. Secondary data was to gather necessary information to guide the conduct of the study in order to confirm or reject the primary data. Questionnaire and interview questions facilitated the collection of data that ensured the best matching of concepts with reality; they provided the same responses from a given set of respondents and helped reduce inconvenience caused by unfavourable interview times and busy schedules. According to [61], a questionnaire is one of the primary tools used to collect data and it is a devise used for acquiring response to a predesigned subject matter using a form which the respondent completes.

Quantitative method was largely used to analyze the data. The results were computed into percentages and subsequently presented in the form of pie, bar charts and tables. Computer data analyses software such as the Statistical Package for Social Sciences (SPSS) and Microsoft Excel were the main tools employed to analyze the data in order to help interpret the results. To ensure reliability and validity of data, reliability was

addressed by developing a case study protocol and the summary of definitions concerning the barriers for using e-procurement system. On the other hand validity was addressed using data collected from multiple sources from other employees who were the users of e-procurement system. The researchers did not force the respondents to be part of the study. Also, the researchers made the respondents anonymous by not asking them their names and assuring them that all the information they provided will be totally confidential and treated in the strictest of confidence. Moreover, researchers did not ask too many questions or ambiguous questions that may embarrass the respondents. The critical ethical issues that were considered in the current study included explaining the rationale for the study, obtaining informed consent of the respondents, not providing financial incentives to respondents, avoiding deception of respondents, maintaining confidentiality, objectivity and high professional standards.

4. Findings

The researchers also sought to ascertain from the respondents the extent they agreed to the status quo of e-procurement in Zimbabwean State owned enterprises (SOEs) through their respective websites. From the study findings revealed that some of the respondents (12%) neither agreed nor disagreed that calls for proposals among commercial state corporations in Zimbabwe. However, it is also clear that 20% of the study participants agreed on the status quo of e-procurement in Zimbabwe whilst 48% of the respondents disagreed that the status quo of e-procurement in Zimbabwean State Owned Enterprises is conducive for the successful implementation of e-procurement in the Zimbabwean public sector. The study revealed that there was a positive relationship between the status quo of the e-procurement in SOEs and the knowledge of the respondents which was important for the success of the study.

In order to confirm the responses elicited in the study, respondents were asked to indicate their knowledge in some selected e-procurement solutions. Respondents demonstrated good knowledge, for instance E-Sourcing 10 (20%), E-Invoicing 7 (14%), E–Tendering 6 (12%), E-Information/Notification 8 (16%) and E-ordering 5 (10%). This demonstration of good awareness of some existing e-procurement solutions is attributable to respondent's youthfulness, education levels and presence of some conditions regarded as enablers for e-procurement. However, respondents also demonstrated poor knowledge in E-contract management 3 (6%), E-Reverse Auctioning 4 (8%), E-Market 3 (6%) and EMRO and Web Based ERP 2 (4%). Understanding the application of these solutions required some technical appreciation which accounted for respondent's poor knowledge. Nonetheless, the objective of this question is achieved since respondents had fairly good idea of all the e-procurement solutions presented for assessment.

Most of the respondents unanimously (30%) agreed that technology incompatibility would affect the adoption of e-procurement. The claim by respondents is attributable to the electricity short supply experienced by the country. Yet their position on technology incompatibility resulted from the limited application of ICT in the manual procurement currently practiced. Data system hacking and cracking was deemed to be other area that would pose a challenge if e-procurement is adopted. The claim by the respondents affirmed the assertion that although the opportunities for improvement seem abound both the private and the public sectors are still cautious as far as the adoption of electronic technologies is concerned [62]. The impact of public policy in any country or nation is a defining factor for the smooth development of the country. The policy of government to take a responsible approach to stimulate economic regeneration by providing deliberate opportunities to local suppliers in particular characterized their responses (16%) since such directives by the state militates against compliance and may render the adoption and deployment of systems such as e-procurement ineffective. From the demographic analysis, it was realized persons engaged in procurement across the institutions surveyed had some minimum level of qualifications that qualified them for their various task, however, it was also reported that a generally limited number of procurement professionals/experts was a challenge with the e-procurement system. Notwithstanding this, a majority of respondents (20%) were emphatic that the introduction of e-procurement could suffer similar fate as the conventional system. The opinion of the 20% respondents dovetailed into the innovative nature of e-procurement particularly the accompanying training requirement such that the fast and swift changing pace of e-procurement environment will always leave a vacuum that requires expert knowledge.

In order to accomplish the desired goals of the research the researchers explored the challenges associated with the current procurement system. The study findings publicized that poor data quality is a major challenge, 24% of the respondents surveyed agree to this. Perception of corruption is yet another problem that received 34% endorsement while other respondents were

however oblivious of the effect of lack of transparency and accountability regarding the paper based procurement method. This is followed by delay and long procurement cycles/bureaucracy, of which 30% of the respondents agreed that the existing paper based procurement is affected by this factor, From the foregoing analysis, it can be said that High cost of procurement will also results from delay and long procurement cycles/bureaucracy; which may likely breed corruption thus explaining the oblivious nature of respondents opinion regarding lack of transparency and accountability in public sector procurement.

6. Conclusions

The study concluded that most of the state owned enterprises in Zimbabwe have adopted the e-procurement system even though several procurement functions are still carried out in the traditional manual system. Some of the functions that are yet to be done through the e-procurement system include; Online tendering, online submission of proposals and advertisement or required items online. The study also concluded that e-procurement is associated with a number of effects on the performance of commercial state corporations in Zimbabwe. Among these effects include: real-time response to both the customers and the market; improves transparency and accountability; improves information flow in the supply chain; assists the commercial state corporations in reducing costs and improvement in competitive bidding and sourcing. Furthermore that study concluded despite the fact that most commercial state corporations have adopted the e-procurement system, some procurement activities are still handled manually.

6.1 Recommendations

The study recommends that there is need for state owned enterprises in Zimbabwe to emphasize on the need to carry out all the procurement functions through e-procurement.

The study also recommends that there need for employees to be trained on usage of the e-procurement system. This will enable them to operationalize the system.

The research recommends that there is also need for state owned enterprises in Zimbabwe to integrate the various functions so that e-procurement can thrive.

The research recommends that the websites of state corporations need to be regularly updated with the latest information concerning procurement activities. Suppliers should be encouraged to summit their quotations online.

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